FINAL DECISION AND RESPONSE TO COMMENTS
ON PROPOSED CORRECTIVE ACTION
UNDER RCRA SECTION 3008 (h)

LEHIGHTON ELECTRONICS, INC., LEHIGHTON, PA

I. INTRODUCTION

A. BACKGROUND

This Final Decision and Response to Comments (Final Decision) is issued by the United States Environmental Protection Agency (EPA) under the authority of the Solid Waste Disposal Act as amended by the Resource Conservation and Recovery Act of 1976 (RCRA) and the Hazardous and Solid Waste Amendments of 1984 (HSWA), 42 U.S.C. §§ 6901 et seq., for the Lehighton Electronics facility (Facility) located at Route 443 and Seneca Road in Lehighton, PA. Lehighton Electronics, Inc. (Lehighton) is subject to an EPA program generally known as "Corrective Action." This program is designed to insure that facilities subject to HSWA have investigated and cleaned up any releases of hazardous waste and/or hazardous constituents at and/or from their property. The purpose of this Final Decision is to describe the Final Remedy selected by EPA to address releases of hazardous waste and/or hazardous constituents at the Facility. This Final Decision presents the concerns and issues raised during the public comment period that followed the issuance of EPA's Statement of Basis for a Proposed Remedy at the Facility. This Final Decision also responds to all comments received by EPA regarding the Proposed Remedy.

Lehighton manufactured printed circuit boards at the Facility from 1965 until March 2001. Prior to 1965, the building was operated as a restaurant. The Facility is located about four miles southwest of Lehighton on a one-half acre lot in a sparsely populated area (Figures 1 and 2). Groundwater beneath the Facility is contaminated with the organic chemical trichloroethylene (TCE), a degreasing agent that was used at the Facility until 1980. One groundwater sample taken from the Facility's production well in September 1999 also contained the organic chemical naphthalene. Naphthalene was detected only at the Facility's production well. Naphthalene has not been detected in two additional groundwater samples taken since 1999. No residential wells have been contaminated.

The RCRA Corrective Action activities performed to date at Lehighton were conducted pursuant to an Administrative Consent Order (Order), entered into by EPA and Lehighton under the authority of Section 3008(h) of RCRA, 42 U.S.C. § 6928(h) (U.S. EPA Docket No. RCRA-3-043 CA). These activities include the completion of:

RCRA Facility Investigation (RFI) - Environmental investigation to characterize fully the release of hazardous wastes and/or hazardous constituents.

Corrective Measures Study (CMS) - Evaluation of clean-up options for contaminated areas.

Interim/Stabilization Measures - Preliminary clean-up activities of contaminated areas.

In accordance with the Order, Lehighton determined the nature and extent of contamination at the Facility and evaluated clean-up options in the RFI/CMS Report that was prepared for the Facility and approved by EPA. Lehighton installed a groundwater pump and treat system as an interim measure to remediate the contaminated groundwater at the facility.

Lehighton continues to operate the groundwater remediation and monitoring system. The groundwater clean-up system consists of pumping contaminated groundwater from the plant area and treating it at the on-site wastewater treatment plant. This process has reduced the contamination from over 150 parts per billion (ppb) of TCE to approximately 30 ppb of TCE. The groundwater monitoring consists of the analysis of on-site and off-site wells for volatile organic chemicals, which includes TCE and its breakdown products. Lehighton has also removed the heating oil from an underground tank that was suspected of leaking.

EPA issued a Statement of Basis describing the Proposed Remedy for Lehighton on August 9, 2000. The Statement of Basis described the information gathered during the environmental investigations of the Facility, described the completed clean-up actions at the Facility, and explained EPA's proposal for the final remedy at the Facility. Consistent with public participation provisions under RCRA, EPA requested comments from the public on the proposal for the final remedy. The public comment period began August 11, 2000 and ended September 25, 2000. The public comment period was announced in the Lehighton Times News on August 11, 2000.

B. PROPOSED REMEDY

In the Statement of Basis, EPA proposed to continue groundwater remediation by pumping and treating the groundwater, along with continued groundwater monitoring. The groundwater clean-up measures currently underway consist of pumping contaminated groundwater from the production well located outside of the plant building and treating it in the on-site treatment system. The Proposed Remedy also included an expansion of groundwater monitoring to include analysis for naphthalene, removal of the empty TCE storage tank, and removal of an empty underground heating oil storage tank and any contaminated soil adjacent to the tank.

C. PUBLIC COMMENTS

The only comments on the Proposed Remedy were submitted by Lehighton. Lehighton objected to the proposed groundwater pumping rate of 10,000 gallons per day for the groundwater remediation. Lehighton contended that recent pumping at lower withdrawal rates resulted in reductions in the contaminant concentrations in the groundwater. In follow-up correspondence, Lehighton also indicated that the proposed water withdrawal rates may add to concerns regarding the adequacy of the groundwater supply at a residential development south of the plant. Lehighton

requested a remediation pumping rate of 2,500 gallons per day.

In response to Lehighton's comments, EPA required that Lehighton perform a pump test to determine the pumping capacity of the aquifer. The aquifer pump test documented that the withdrawal well is capable of pumping 10,000 gallons per day without impacting the water table elevation. Therefore, this final decision requires an average groundwater withdrawal rate of 10,000 gallons per day for the groundwater remediation system. Modifications to the pump rate may be approved by EPA based on justification submitted by Lehighton.

II. THE SELECTED REMEDY

The selected Final Remedy is described below. EPA believes that the Final Remedy protects human health and the environment and is consistent with EPA's nine criteria for remedy selection, which are discussed in the Corrective Action Advanced Notice of Proposed Rulemaking, 61 Fed. Reg. 19432 (May 1, 1996). This Final Remedy adds a requirement to provide a potable water supply that meets EPA drinking water standards. This Final Remedy also eliminates the requirement to monitor the residential properties on the other side of Mahoning Creek, since it is unlikely that these wells are hydraulically connected to the groundwater on the Facility side of Mahoning Creek. The requirement to monitor the nearest residential well is retained. Other elements of this Final Remedy differ slightly from the Proposed Remedy to allow flexibility during implementation. The proposed clean-up standards are unchanged in this Final Decision. For clarification, the TCE breakdown products referenced in the Statement of Basis are specifically identified below.

A. DESCRIPTION OF FINAL REMEDY

The corrective action for the Facility includes the following four components:

1. Remediation of Contaminated Groundwater - The contaminated groundwater will be remediated by pumping the Facility's production well. The average groundwater removal rate will be 10,000 gallons per day. The contaminated groundwater will be treated on-site as necessary to comply with Lehighton's Clean Water Act National Pollutant Discharge Elimination System (NPDES) Permit requirements. Lehighton's current NPDES Permit is written for wastewater from printed circuit board manufacturing (NPDES Permit No. PA-0044920). Lehighton must apply to the Pennsylvania Department of Environmental Protection for revised NPDES Permit discharge limits that reflect the current waste stream of solely contaminated groundwater. Alternately, the contaminated groundwater may be sent off-site for treatment in accordance with applicable state and Federal treatment and disposal requirements. Groundwater remediation will continue until TCE is reduced to the Maximum Contaminant Level (MCL), TCE breakdown products remain below their respective MCLs, and naphthalene remains below EPA's risk-based concentration for tap water (since an MCL has not been established for naphthalene). MCLs are established by EPA pursuant to the Safe Drinking Water Act, 42 U.S.C. §§ 300f et seq. (See 40 C.F.R.Part 141). EPA's risk-based concentrations for tap water are found in the Region III Risk-Based Concentration

Table published semi-annually, and are available at EPA's web site at www.epa.gov/reg3hwmd/risk/index.htm. Contaminants of concern for the Lehighton Facility and their respective groundwater clean-up standards are as follows:

TABLE 1

Contaminant of Concern	Clean-up Standard
Trichloroethylene (TCE)	5 parts per billion (ppb)
1,1-Dichloroethene	7 ppb
trans-1,2-Dichloroethene	100 ppb
cis-1,2-Dichloroethene	70 ppb
Vinyl Chloride	2 ppb
Naphthalene	6.5 ppb

2. Groundwater Monitoring - The groundwater from the Facility's production well and the nearest residential well will be monitored annually for the chemicals listed in the Contaminants of Concern in Table 1, above. The location of these two wells are identified on Figure 1, attached hereto. Monitoring for naphthalene may be discontinued if naphthalene concentrations remain below the Clean-up Standard for three consecutive years. Monitoring will continue until EPA authorizes Lehighton to discontinue monitoring. The monitoring program may be modified if approved by EPA. If the residential well sample exceeds the Clean-up Standards for the Contaminants of Concern (Table 1, above), Lehighton will notify EPA and the Pennsylvania Department of Environmental Protection within seven (7) days of receipt of the data by Lehighton. Appropriate action will be directed by EPA and/or the Pennsylvania Department of Environmental Protection.

3. TCE Tank Removal - The former TCE storage tank will be removed, cleaned, and disposed of in accordance with state regulations.

4. Fuel Oil Tank Removal - The tank was emptied on August 2, 2000. It shall be removed and disposed of in accordance with any applicable regulations. All contaminated soil that is above the groundwater table shall be removed and disposed of as a residual waste in accordance with the Pennsylvania Department of Environmental Protection regulations, PA Title 25, Chapters 287 - 299. Contaminated groundwater will be remediated as described in item II.A.1 (above).

5. Potable Water Supply - Lehighton shall provide any user at the Facility a potable water supply that meets the requirements of the Safe Drinking Water Act, 42 U.S.C. §§ 300f, et seq. If treated groundwater is used as the potable water supply, the water treatment system must be adequately sized to accommodate all expected water uses at the Facility, with at least two treatment systems in series to prevent exposure to contaminated groundwater in the event of contaminant break-through in the primary treatment system. In order to assess the adequacy of the water treatment system, water samples shall be taken before, between and after the water treatment systems and analyzed for the Contaminants of Concern. Samples

shall be taken quarterly the first year. Subsequently, sampling shall be conducted at least annually, and the sampling schedule will be determined based on an evaluation of the system's performance during the first year.

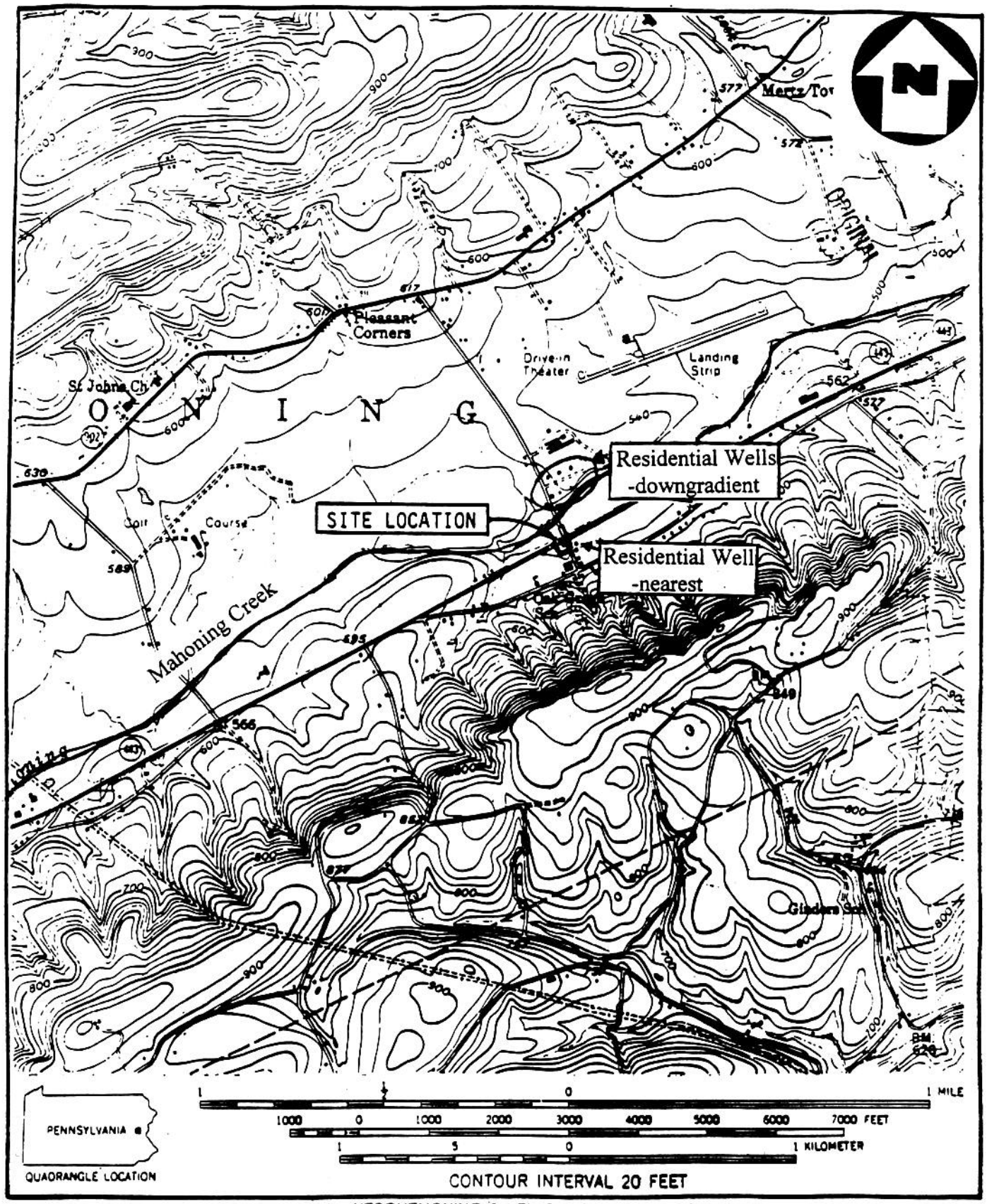
6. Notification of Groundwater Contamination - In the event of any conveyance, assignment or transfer of the Facility or any interest in the Facility, Lehighton shall continue to be bound by any requirement to perform the selected remedy set forth in this Final Decision. In the event of such a conveyance, assignment or transfer, Lehighton shall expressly reserve in the deed or other instrument effecting the transfer an easement providing that the untreated groundwater may not be used as a potable water supply until EPA determines that the groundwater is no longer contaminated.

III. DECLARATION

Based on the Administrative Record compiled for this Facility, I have determined that the selected remedy as set forth in this Final Decision is appropriate and will be protective of human health and the environment.

Date: APR 8 2002

Thomas C. Voltaggio
Acting Regional Administrator
U.S. Environmental Protection Agency
Region III



SOURCE: (7.5 MINUTE SERIES) U.S.G.S. NESQUEHONING & LEHIGHTON, PA QUADS.

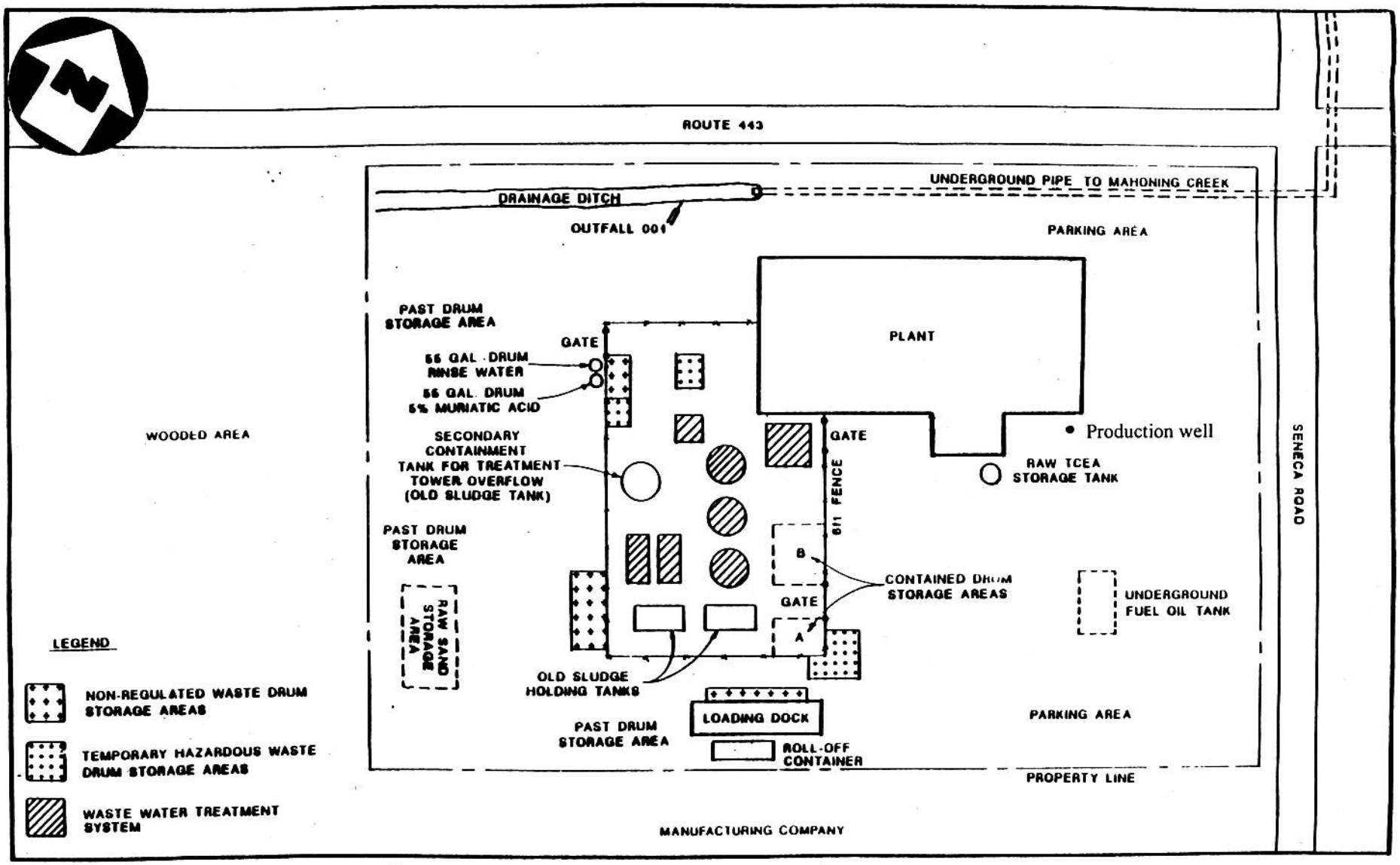
SITE LOCATION MAP

LEHIGHTON ELECTRONICS, LEHIGHTON, PA

SCALE 1: 24000

FIGURE 1

NUS CORPORATION



SITE SKETCH

LEHIGHTON ELECTRONICS, LEHIGHTON, PA

(NO SCALE)

FIGURE 2

NUS CORPORATION